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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/592,916	06/13/2000	Adriano Huber	PM 258042	5750

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EXAMINER
HAMILTON, MONPLAISIR G

ART UNIT	PAPER NUMBER
2135	11

DATE MAILED: 07/01/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

	Application No.		Applicant(s)	
Office Action Summary	09/592,916		HUBER ET AL.	
	Examiner		Art Unit	
	Monplaisir G Hamilton		2135	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

> A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE <u>3</u> MONTH(S) FROM
> THE MAILING DATE OF THIS COMMUNICATION.
> - Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
> - If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
> - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
> - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *23 March 2004*.

2a)☒ This action is **FINAL**.   2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-35* is/are pending in the application.

    4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-35* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

    Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

    Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

    a)☐ All   b)☐ Some * c)☐ None of:

      1.☐ Certified copies of the priority documents have been received.

      2.☐ Certified copies of the priority documents have been received in Application No. _____.

      3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

    * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)

2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)

3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
    Paper No(s)/Mail Date _____.

4) ☐ Interview Summary (PTO-413)
    Paper No(s)/Mail Date. _____.

5) ☐ Notice of Informal Patent Application (PTO-152)

6) ☐ Other: _____.

DETAILED ACTION

1.   Claims 1-25 were pending. The communication field on 3/23/04 amended Claims 1-6, 8-10, 14-15, 18-25 and added Claims 26-35. Claims 1-35 remain for examination.

Response to Arguments

2.   Applicant's arguments filed 3/23/04 have been fully considered but they are not persuasive.

Referring to Claim 25:

Applicants argue: "Gelman does not teach that encryption is used and further does not teach that not all of the packets are decrypted."

Examiner disagrees with applicant. Gelman explicitly discloses that encryption is used on the wireless link to ensure that the transmitted data remains private (col 5, lines 1-5; 60-65). Furthermore, Gelman discloses that the data is routed without decrypting all of the packets (col 10, line 30-col 9, 10).   Specifically Gelman states that the IP layer routes all TCP packets to be sent on the wireless link directly to the gateway (col 10, lines 55-65; col 11, lines 1-5). Thus enabling the gateway to properly handle the IPSEC communications.

Applicant's arguments, see Paper No. 10, filed 3/23/04, with respect to the rejection of Claims 19-24 under 35 U.S.C. § 102(b) as being anticipated by Gelman et al (US 6,415,329) and Claims 1-10, 12-14 and 18 under 35 U.S.C. § 103(b) as being unpatentable over Hsu et al (US 6,587,684) in view of Gelman (US 6,415,329), have been fully considered and are persuasive.

Therefore, these rejections have been withdrawn. However, upon further consideration, a new

ground(s) of rejection is made in view of Lincke et al (US 6,253,326).

Claim Rejections - 35 USC § 112

The following is a quotation of the second paragraph of 35 U.S.C. 112:

> The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the
> subject matter which the applicant regards as his invention.

3.   Claims 1-17, and 20 are rejected under 35 U.S.C. 112, second paragraph, as being

indefinite for failing to particularly point out and distinctly claim the subject matter which

applicant regards as the invention.

A broad range or limitation together with a narrow range or limitation that falls within the

broad range or limitation (in the same claim) is considered indefinite, since the resulting claim

does not clearly set forth the metes and bounds of the patent protection desired. Note the

explanation given by the Board of Patent Appeals and Interferences in *Ex parte Wu*, 10

USPQ2d 2031, 2033 (Bd. Pat. App. & Inter. 1989), as to where broad language is followed by

"such as" and then narrow language. The Board stated that this can render a claim indefinite by

raising a question or doubt as to whether the feature introduced by such language is (a) merely

exemplary of the remainder of the claim, and therefore not required, or (b) a required feature of

the claims. Note also, for example, the decisions of *Ex parte Steigewald*, 131 USPQ 74 (Bd.

App. 1961); *Ex parte Hall*, 83 USPQ 38 (Bd. App. 1948); and *Ex parte Hasche*, 86 USPQ 481

(Bd. App. 1949). In the present instance, claims 1-17 and 20 recite the broad recitation or, and

the claim also recites and which is the narrower statement of the limitation. And/Or renders the

Claim indefinite.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the

basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

4.   Claim 25 is rejected under 35 U.S.C. 102(e) as being anticipated by Gelman et al (US

6,415,329).

Referring to Claim 25:

Gelman discloses a method by which a terminal can access a server, said method

comprising the steps of:

said terminal sending a request for said server to a gateway (col 10, lines 50-650, wherein

security utilized between said terminal and said gateway is based on a first security protocol, said

first security protocol including an encryption (col 11, lines 1-10);

securing said server with a second security protocol, said second security protocol also

including an encryption (col 3, lines 1-5); and

converting between said first and said second security protocol in a secured domain of

said server administrated by an administrator (col 31, lines 50-65; col 7, lines 15-30), and

wherein encrypted packets sent by said terminal are routed by said gateway to said secured

domain without said gateway decrypting all of the packets transmitted during a session (col 11,

lines 1-10).

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the

basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

5.   Claims 1-24 and 26-35 are rejected under 35 U.S.C. 102(e) as being anticipated by

Lincke et al (US 6,253,326).

Referring to Claim 1:

Lincke discloses a method by which a mobile subscriber with a WAP-enabled terminal

can access a WEB or WAP server, comprising the steps of:

said terminal sending a request for said server to a WAP gateway (col 8, lines 40-50),

wherein encryption in the wireless interface between said WAP-enabled terminal and said

gateway is based on WTLS (Wireless Transport Layer Security) (col 83, lines 1-10), and

wherein an encryption protocol used by said server is based on the SSL and/or TLS

security protocol (col 111, lines 15-25); and

converting between WTLS and SSL and/or TLS in a secured domain of said server

administrated by an administrator (col 91, lines 50-65), wherein the WTLS encrypted packets

sent by said terminal are routed by said gateway to said secured domain without said gateway

decrypting all of the encrypted packets transported during a session (col 17, lines 40-50; col 113,

line 55-col 114, line 15).

Referring to Claim 2:

Lincke discloses the limitations of Claim 1 above. Lincke further discloses said gateway

routes said packets to a proxy in said secured domain, said proxy using at least one protocol layer

of the WAP protocol (col 17, lines 40-45; col 18, lines 45-68).

Referring to Claim 3:

Lincke discloses the limitations of Claim 2 above. Lincke further discloses said packets

are routed according to the URL and/or the domain name of the requested page in said gateway

(col 114, lines 20-35).

Referring to Claim 4:

Lincke discloses the limitations of Claim 2 above. Lincke further discloses said packets

are routed according to the port number (col 114, lines 20-35).

Referring to Claim 5:

Lincke discloses the limitations of Claim 4 above. Lincke further discloses said

encrypted packets are routed according to different port numbers to different secured domains

(col 18, lines 20-35).

Referring to Claim 6:

Lincke discloses the limitations of Claim 4 above. Lincke further discloses said port

numbers are extracted in an application layer of said gateway from the URL of the request page

(col 18, lines 20-35).

Referring to Claim 7:

Lincke discloses the limitations of Claim 6 above. Lincke further discloses said port

number is extracted from only a restricted number packets during a session, and wherein the

routing of at least one of the following packets depends on this extracted port number (col 17,

lines 10-25; col 18, lines 20-40;).

Referring to Claim 8:

Lincke discloses the limitations of Claim 7 above. Lincke further discloses wherein a

proxy server in said secured domain extracts the URL and/or the port number of the received

packets and where the proxy server sends back a command to said gateway if it receives a packet

with a different URL and/or port number (col 18, lines 20-68).

Referring to Claim 9:

Lincke discloses the limitations of Claim 4 above. Lincke further discloses said port

number is extracted from said URL of the required web page in said terminal (col 18, lines 20-

30).

Referring to Claim 10:

Lincke discloses the limitations of Claim 9 above. Lincke further discloses said port

number is extracted by a browser from said URL of the required web page (col 11, lines 15-40).

Referring to Claim 11:

Lincke discloses the limitations of Claim 8 above. Lincke further discloses, wherein

the browser in said terminal only copies said port number in said packets if an end-to-end

secured connection is requested (col 13, lines 35-50).Referring to Claim 12:

Referring to Claim 12:

Lincke discloses the limitations of Claim 3 above. Lincke further discloses said packets

in said gateway are routed to a secured domain if said port number is comprised in a predefined

range (col 114, lines 20-30).

Referring to Claim 13:

Lincke discloses the limitations of Claim 3 above. Lincke further discloses said gateway

sends a redirect command to said terminal if an end-to-end secured connection is requested (col

18, lines 30-40; col.19, lines 5-25).

Referring to Claim 14:

Lincke discloses the limitations of Claim 13 above. Lincke further discloses said redirect

command is time limited (col 19, lines 1-25).

Referring to Claim 15:

Lincke discloses the limitations of Claim 13 above. Lincke further discloses a proxy

server in said secured domain extracts the URL and/or the port number of the received packets

and sends a redirect command back to said terminal as soon as the session is to be routed to said

gateway (col 18, lines 35-65; col 19, lines 1-35).

Referring to Claim 16:

Lincke discloses the limitations of Claim 13 above. Lincke further discloses said redirect

command contains a forwarding address which is extracted from a document made accessible by

said WEB or WAP server (col 19, lines 1-20).

Referring to Claim 17:

Lincke discloses the limitations of Claim 13 above. Lincke further discloses said redirect

command contains a document which includes the forwarding address (col 18, lines 20-65).

Referring to Claim 18:

Lincke discloses a method by which a mobile user with a WAP-enabled terminal can

access a WEB or WAP server, said method comprising the steps of:

said terminal sending a request for said server to a WAP gateway (col 11, lines 5-30),

wherein a browser in said terminal extracts the port number of the demanded WEB or WAP page

and copies it to packets sent to said gateway (col 13, lines 40-50); and

wherein routing said packets in said gateway according to this port number (col 114, lines 20-30).

Referring to Claim 19:

Lincke discloses a gateway comprising:

means for receiving packets encrypted according to the WTLS protocol from WAP-enabled terminals (col 18, lines 1-20, 60-68);

means for converting said packets into SSL-encrypted requests (col 91, lines 50-51); and means for transmitting said SSL-requests to a receiving server (col 91, lines 50-51), wherein said gateway can recognize WTLS-encrypted packets that are to be sent on transparently and can convert said WTLS-encrypted packets into SSL-encrypted request without decrypting the information contained in said WTLS-encrypted packets (col 18, lines 1-65; col 83, lines 1-20; col 92, lines 10-15).

Referring to Claim 20:

Lincke discloses the limitations of Claim 19 above. Lincke further discloses wherein said WTLS-encrypted packets are routed according to the URL and/or the domain name of the requested page (col 114, lines 20-35).

Referring to Claim 21:

Lincke discloses the limitations of Claim 19 above. Lincke further discloses said WTLS-encrypted packets are routed according to the port number of the requested page (col 18, lines 20-45; col 114, lines 20-35).

Referring to Claim 22:

Lincke discloses the limitations of Claim 21 above. Lincke further discloses said WTLS-encrypted packets are routed to different secured domains according to different port numbers (col 18, lines 20-45).

Referring to Claim 23:

Lincke discloses the limitations of Claim 21 above. Lincke further discloses said port number is extracted from the URL of the requested page in an application layer of said gateway (col 8, lines 5-35).

Referring to Claim 24:

Lincke discloses the limitations of Claim 21 above. Lincke further discloses said port number is extracted during a session only from a restricted number of WTLS-encrypted packets, and wherein the routing of at least one following WTLS-encrypted packet depends on said extracted port number (col 17, lines 10-30; col 18, lines 20-40).

Referring to Claims 26 and 31:

A method for performing end-to-end secure data transfer between a terminal and a server, wherein said terminal is connected to said server via a wireless connection between said terminal and a gateway, said method comprising the steps of:

said terminal requesting a secure communication session with said server via said gateway, said requesting including the steps of (col 17, lines 40-50):

said terminal generating a request including request packets encrypted using a WTLS protocol (col 83, lines 1-20), said terminal sending said request to said gateway, said gateway forwarding said request to said server or to another server (col 18, lines 20-45), wherein said gateway does not decrypt all of said request packets, and said server or said another server decrypting some number of said request packets using said WTLS protocol (91, lines 50-60);

and

said server or said another server serving data to said terminal via said gateway, said serving including the steps of:

said server or said another server sending said data including data packets encrypted using said WTLS protocol to said gateway (col 114, line 45-col 115, line10);

said gateway forwarding said data packets to said terminal, wherein said gateway does not decrypt all of said data packets (col 18, lines 20-35); and said terminal decrypting said data packets using said WTLS protocol (col 89, lines 5-20).

Referring to Claims 27 and 32:

Lincke discloses the limitations of Claims 26 and 31 above. Lincke further discloses said

gateway must decrypt some but not all of said request packets to forward said request to said

server or said another server (col 18, lines 20-35).

Referring to Claims 28 and 33:

Lincke discloses the limitations of Claims 27 and 32 above. Lincke further discloses said

gateway must decrypt some but not all of said data packets to forward said data to said terminal

(col 18, lines 45-60).

Referring to Claims 29 and 34:

Lincke discloses the limitations of Claims 26 and 32above. Lincke further discloses a

browser on said terminal provides information to said gateway for forwarding said request to

said server or said another server without said gateway decrypting any of said request packets

(col 11, lines 25-50).

Referring to Claims 30 and 35:

Lincke discloses the limitations of Claims 29 and 34 above. Lincke further discloses said

information includes one or more of: a port number, a domain name, and an URL (col 18, lines

20-45).

Final Rejection

6.   Applicant's amendment necessitated the new ground(s) of rejection presented in this

Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a).

Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE

MONTHS from the mailing date of this action. In the event a first reply is filed within TWO

MONTHS of the mailing date of this final action and the advisory action is not mailed until after

the end of the THREE-MONTH shortened statutory period, then the shortened statutory period

will expire on the date the advisory action is mailed, and any extension fee pursuant to 37

CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event,

however, will the statutory period for reply expire later than SIX MONTHS from the date of this

final action.

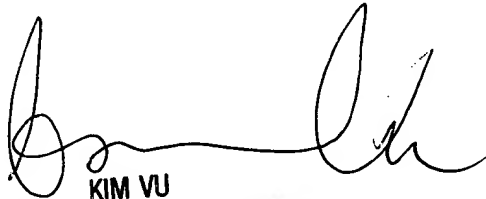## *Conclusion*

Any inquiry concerning this communication or earlier communications from the

examiner should be directed to Monplaisir G Hamilton whose telephone number is (703) 305-

5116. The examiner can normally be reached on Monday - Friday (8:00 am - 4:30 pm).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's

supervisor, Kim Y Vu can be reached on (703) 305-4393. The fax phone number for the

organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent

Application Information Retrieval (PAIR) system. Status information for published applications

may be obtained from either Private PAIR or Public PAIR. Status information for unpublished

applications is available through Private PAIR only. For more information about the PAIR

system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR

system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

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